

# **2014 Highway Needs and Financing Interim Committee**

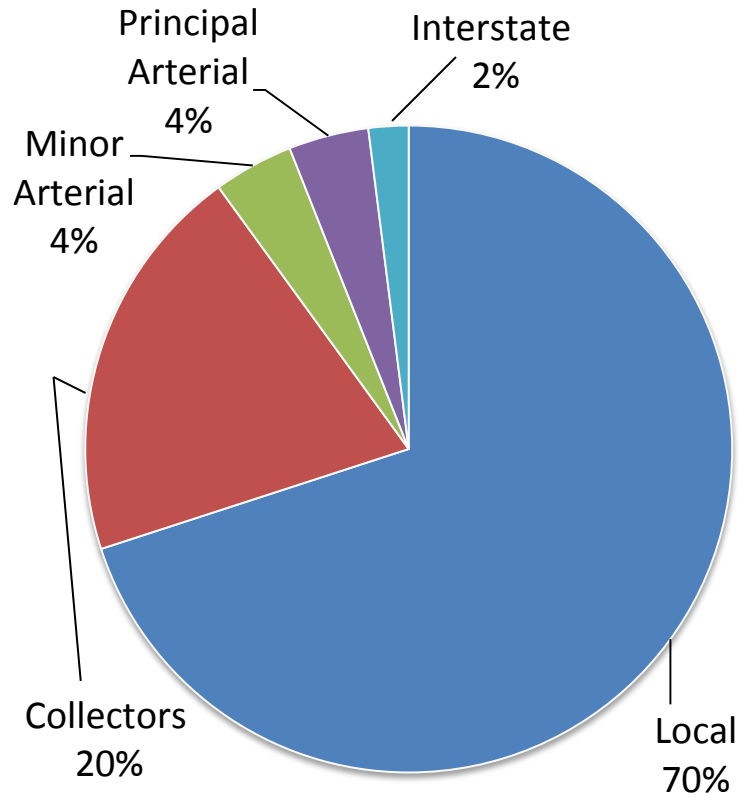
## **Subgroups:**

- Yankton
- Sioux Falls
- Watertown
- Aberdeen
- Belle Fourche
- Rapid City

# Why Study Highway Needs and Financing?

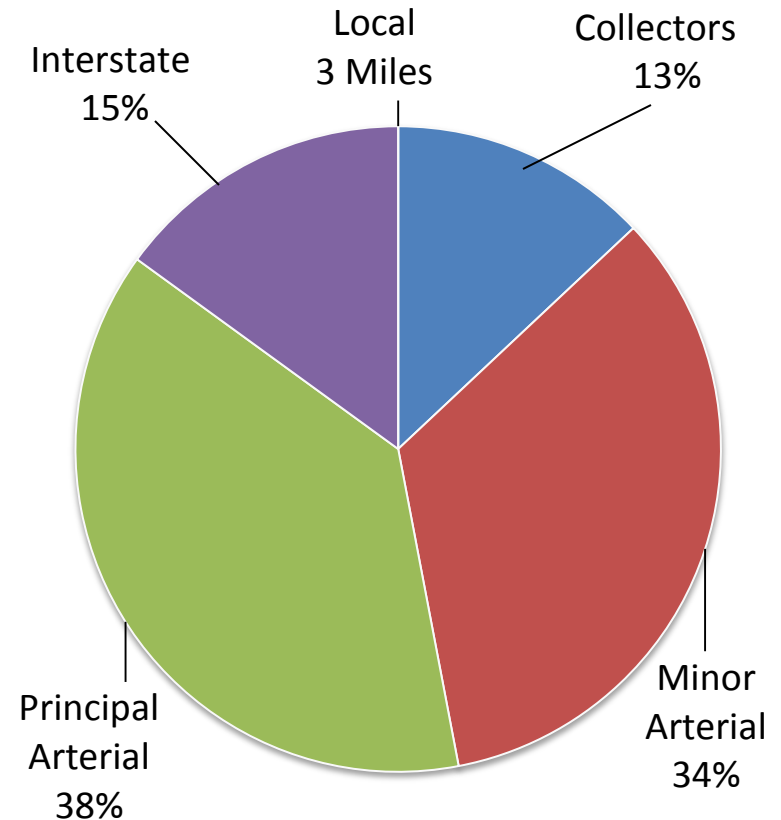
- Chosen as the number one priority topic for an interim study by the Legislature
- \$55 billion worth of goods shipped to and from SD sites each year
- Federal Highway Trust Fund solvency issues and uncertainty surrounding future funding
- Rapid increases in road infrastructure costs
- Deteriorating future road conditions

# Functional Classification Mileage



**All South Dakota  
Jurisdictions**

**Approximately 83,650 Miles**

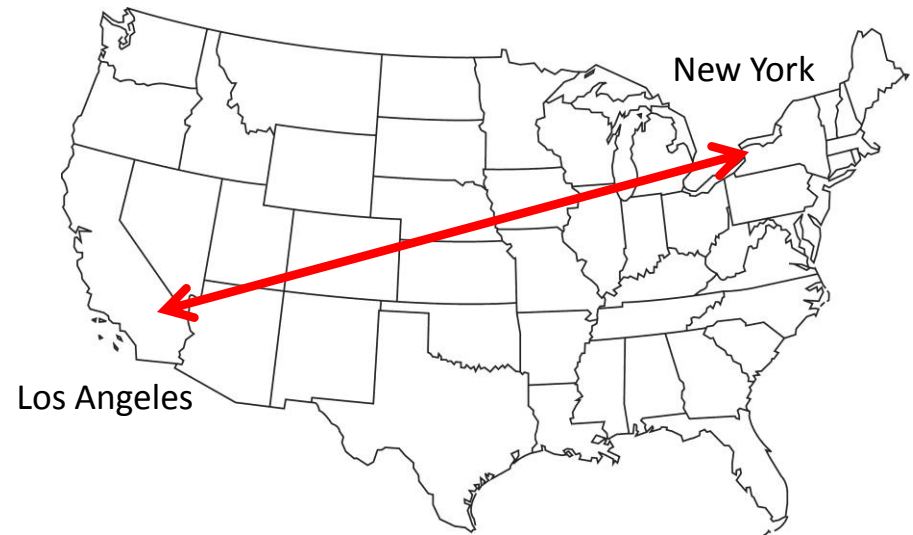


**State  
Highways**

**Approximately 8,850 Miles**

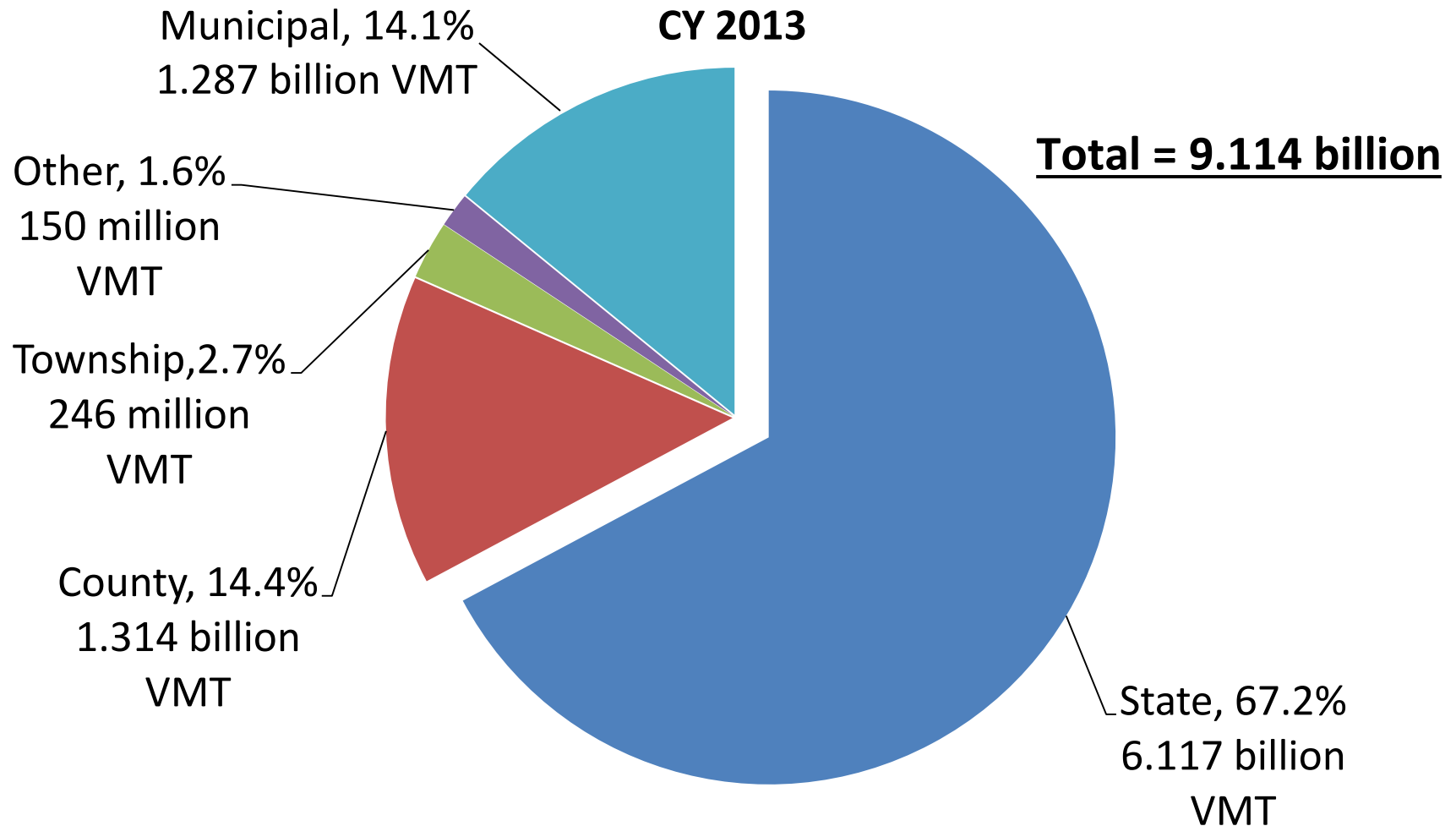
**South Dakota's 83,650 miles of roads is equivalent to 3.5 times around the world**

**8,850 miles of state roads equals 3.6 trips between Los Angeles and New York**



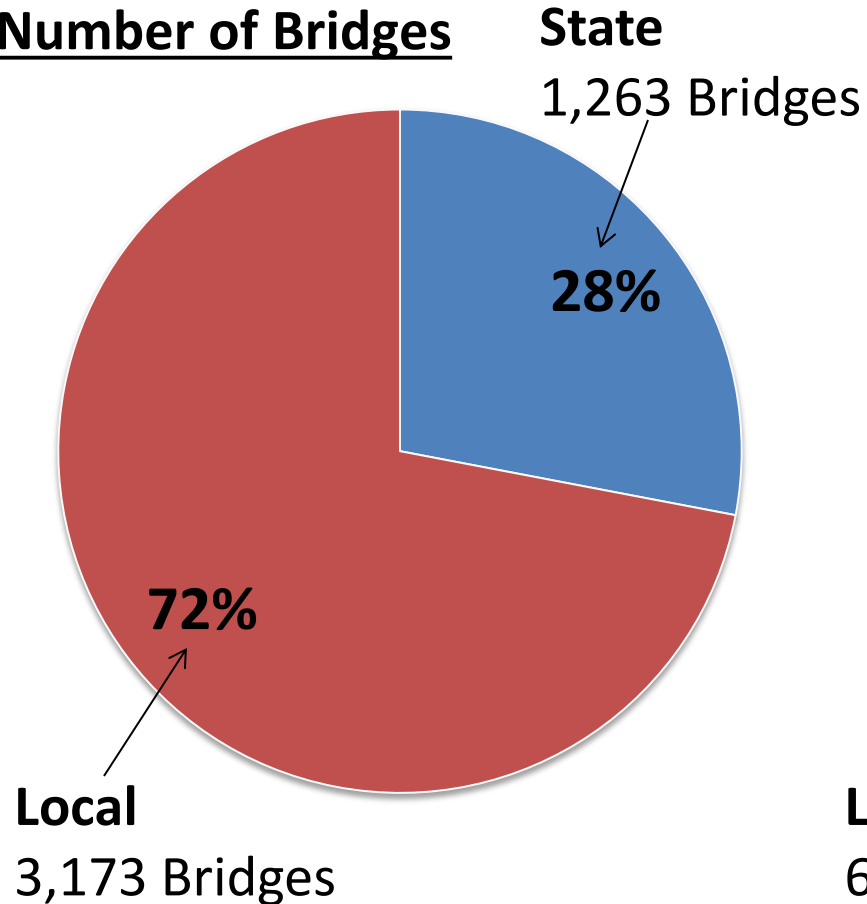
# Annual Vehicle Miles of Travel By Jurisdiction

CY 2013

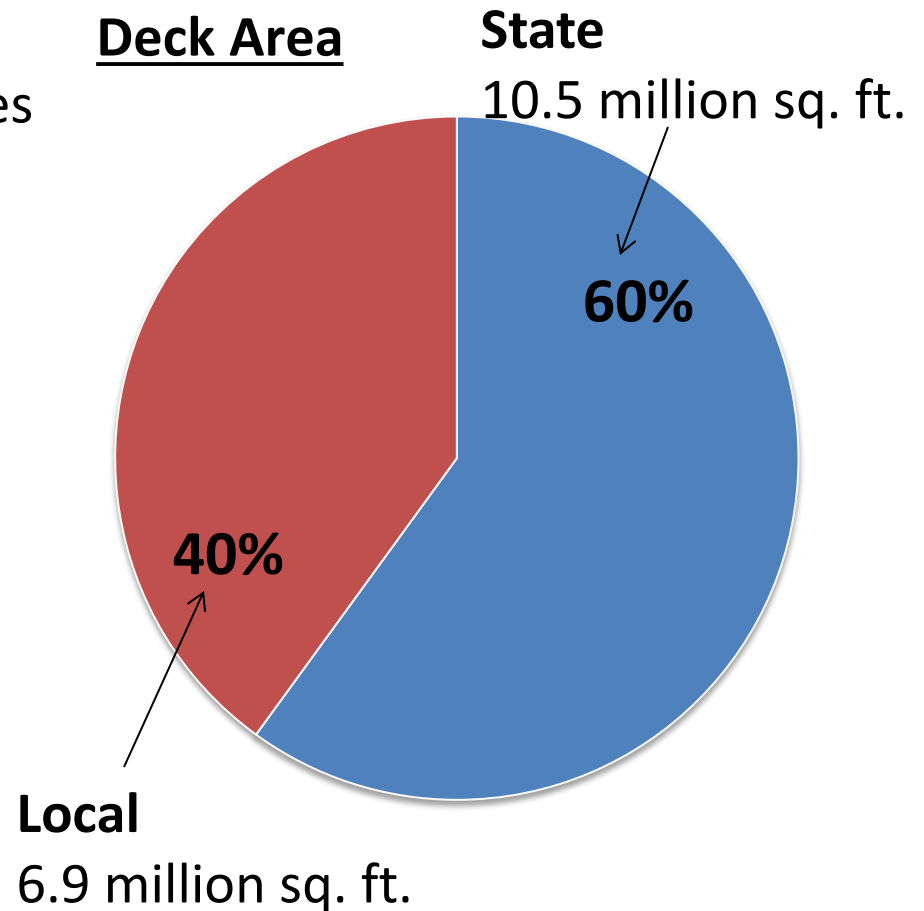


# Comparison of State and Local Bridges

## Number of Bridges



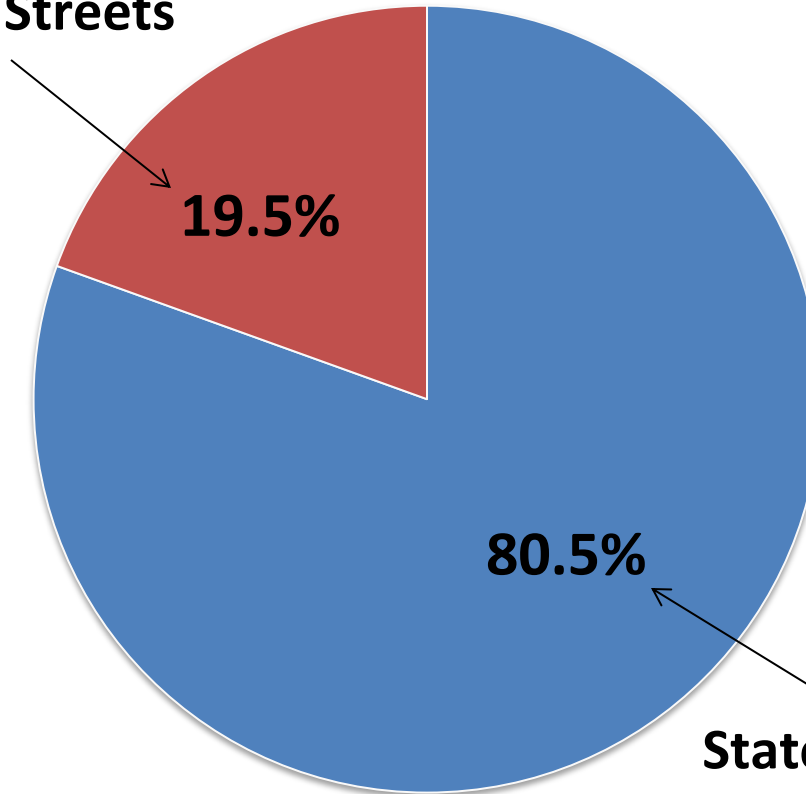
## Deck Area



# Heavy Truck Vehicle Miles of Travel By Jurisdiction

CY 2013

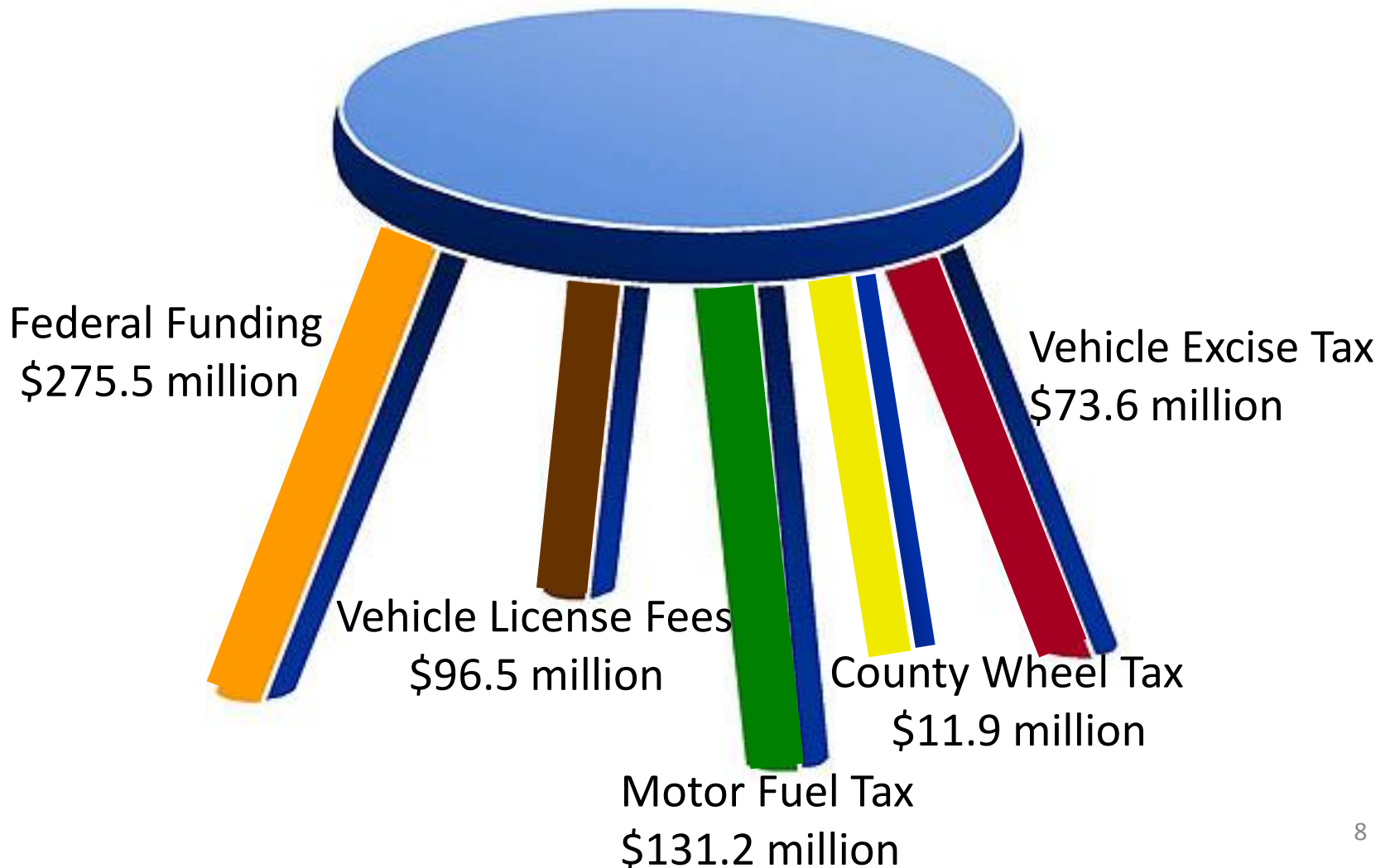
**Other Roads and Streets**  
257 million VMT



**State Highway System**  
1,058 million VMT

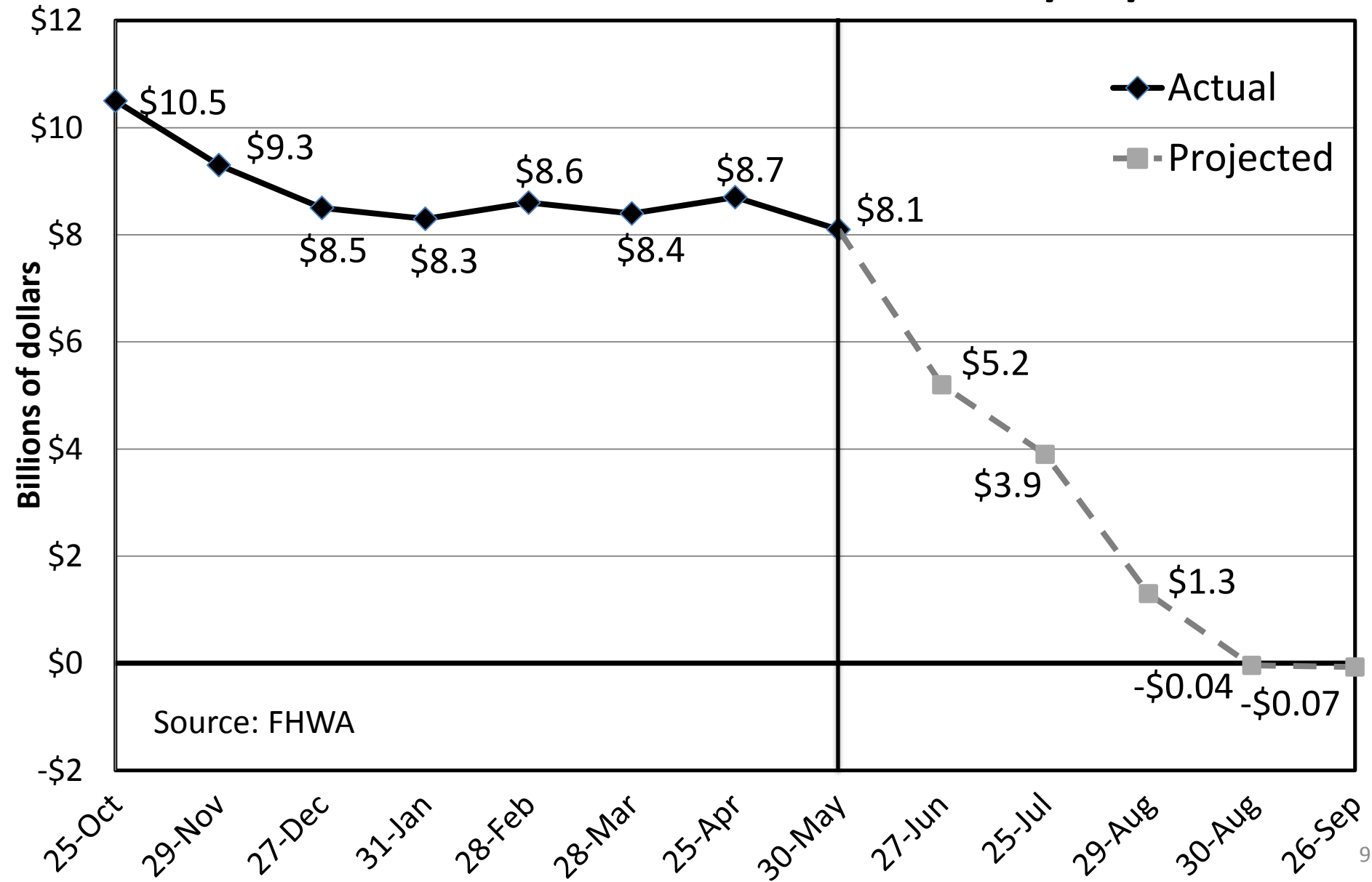
# Revenue: The 5 Legged Stool

FY 2013

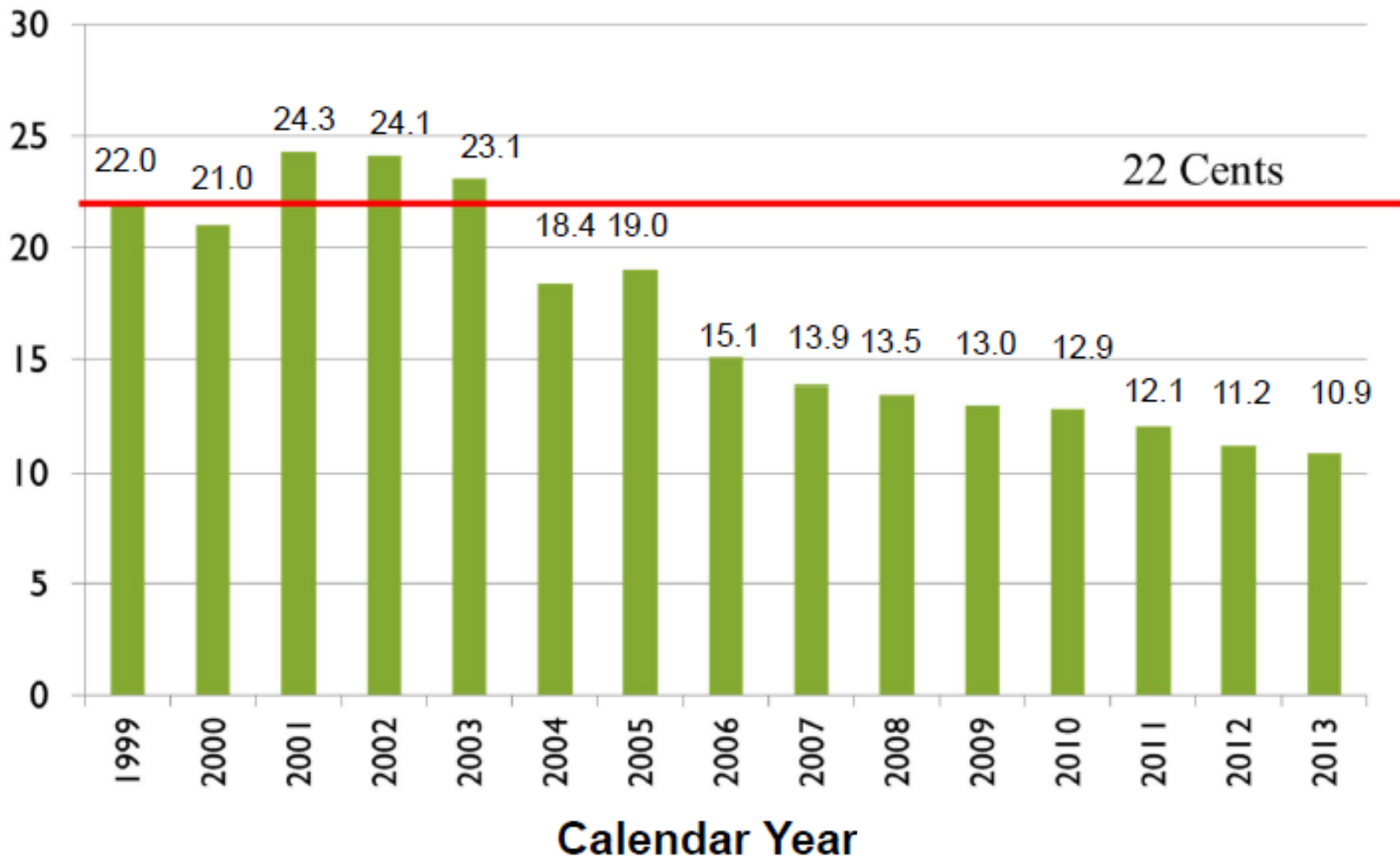




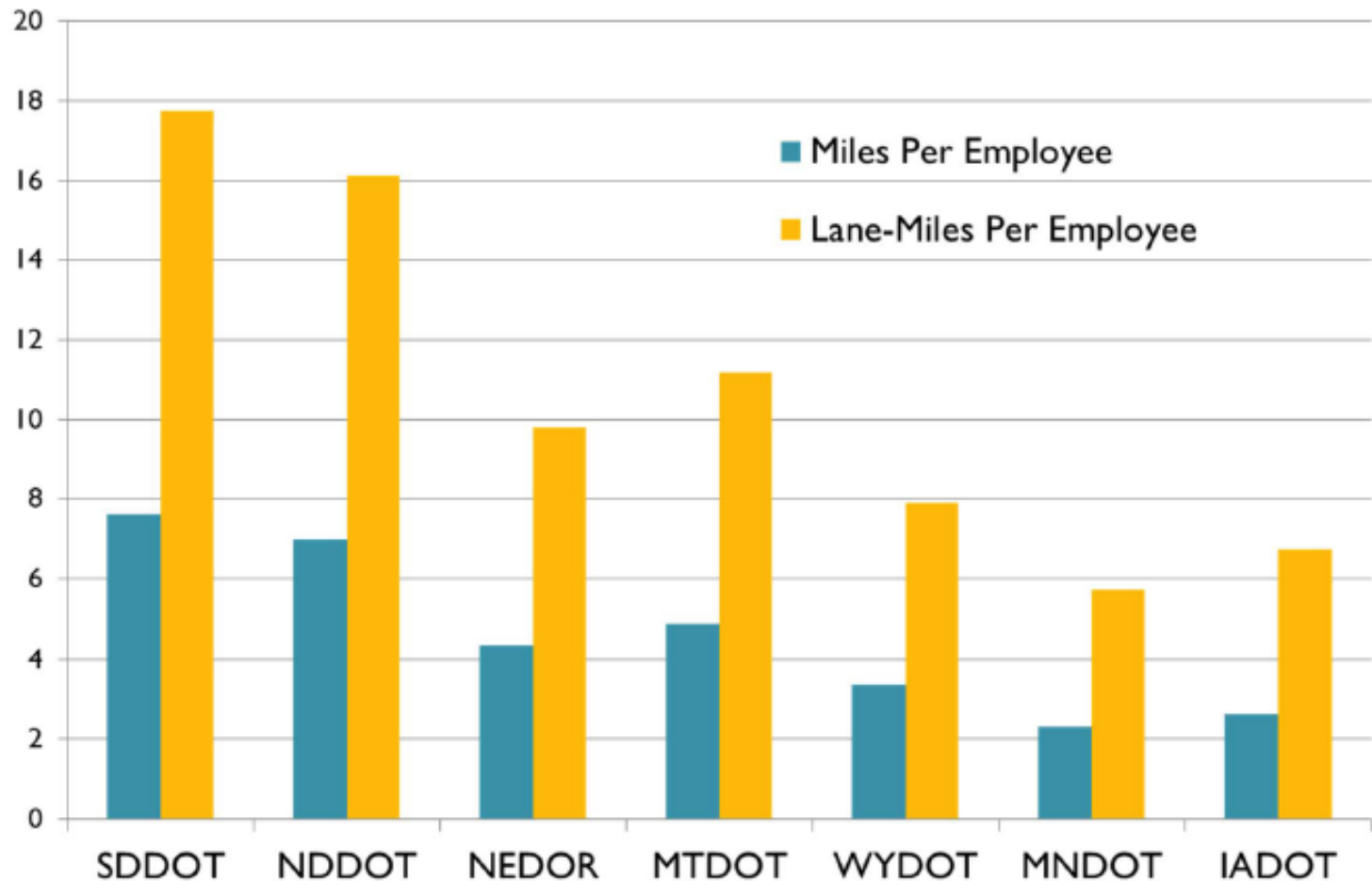
# Federal Highway Trust Fund FY 2014 Projected Estimates for End-of-Month Cash Balances as of 5/30/2014



# SD Gas Tax Purchasing Power Adjusted for the Inflation of Road & Bridge Construction

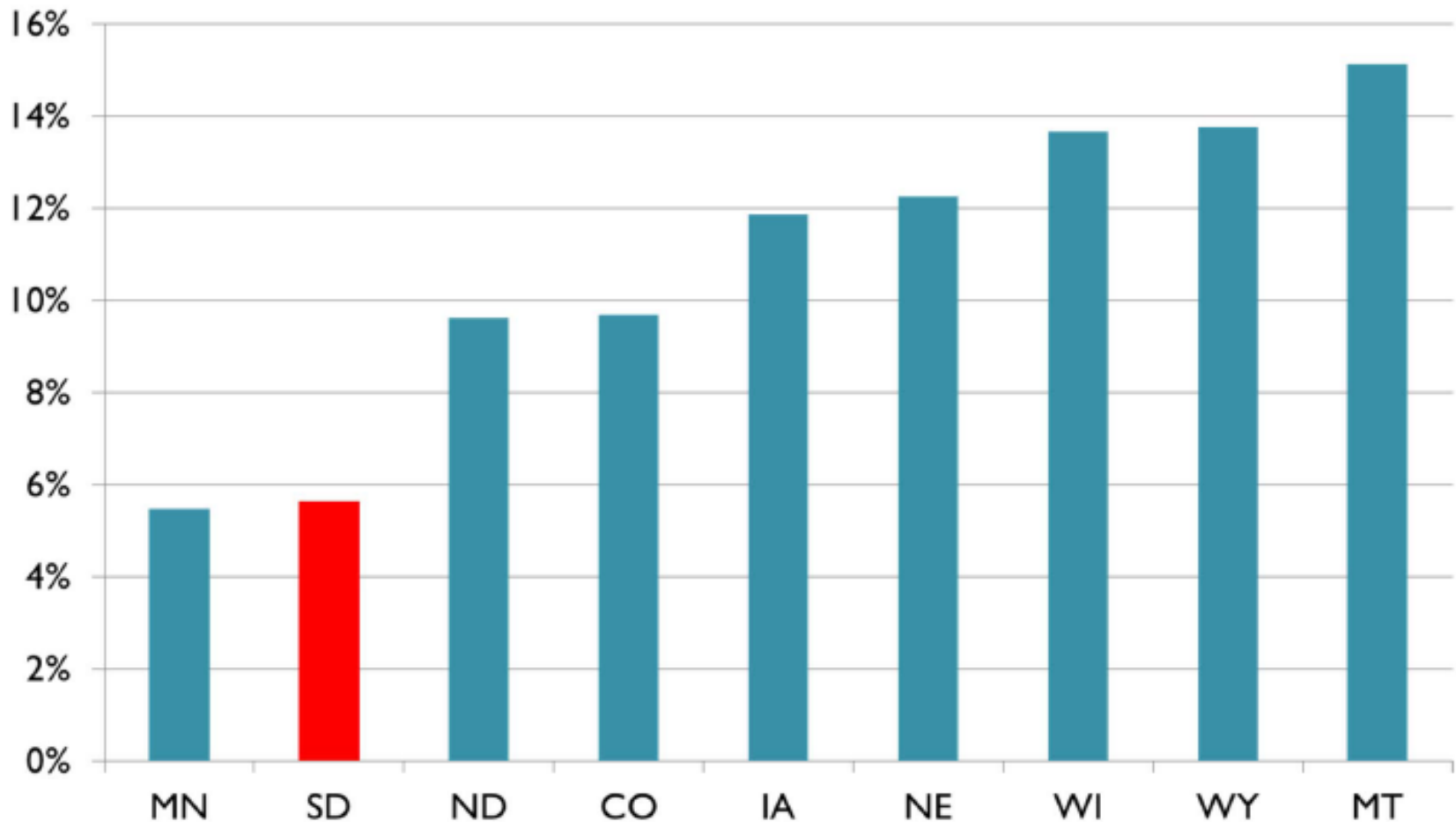


# Size of State Highway System Compared to Number of DOT Personnel



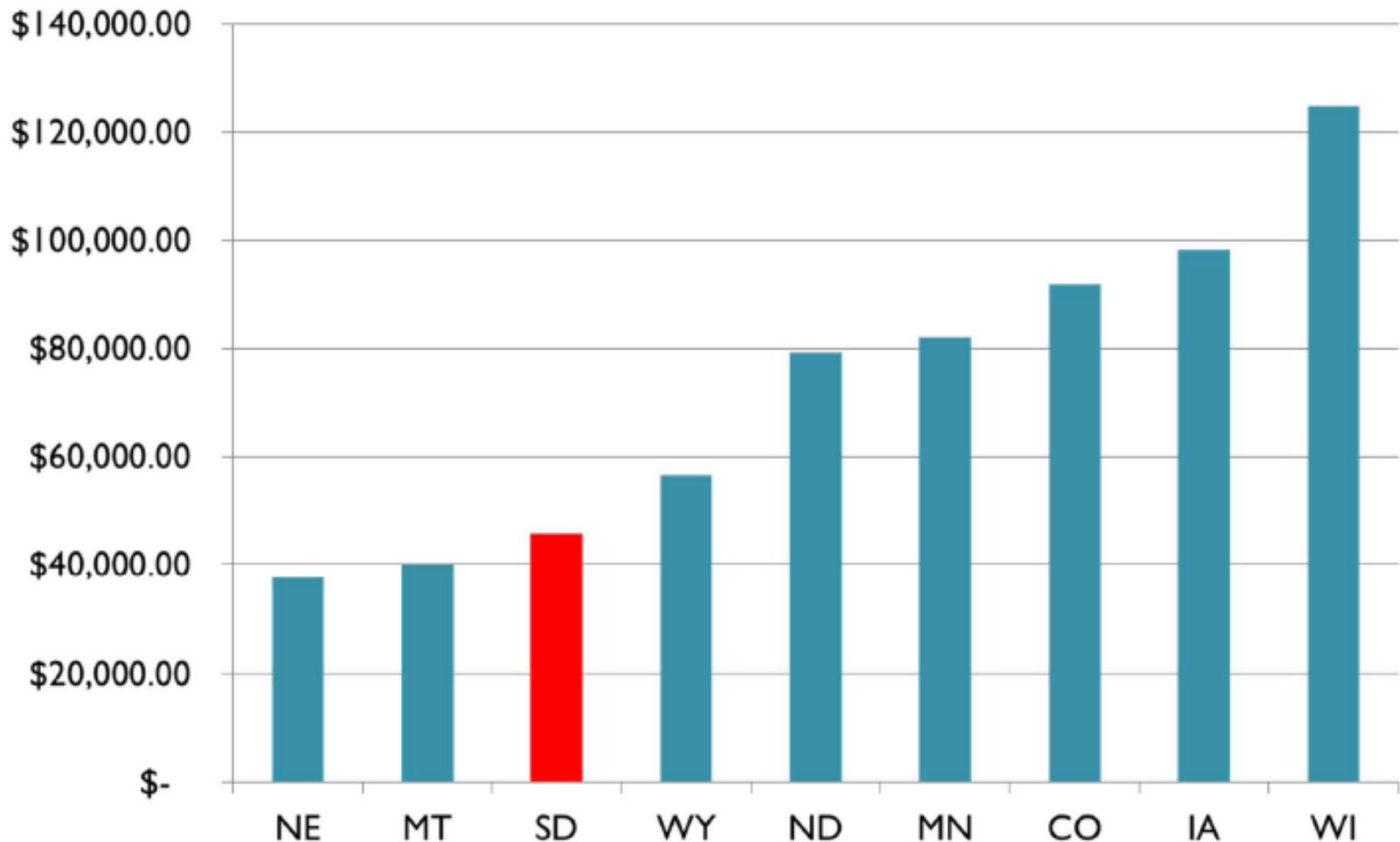
Source: FHWA Statistics (2011) & AASHTO Transportation Governance and Finance (2011)

# Preliminary & Construction Engineering % of Construction



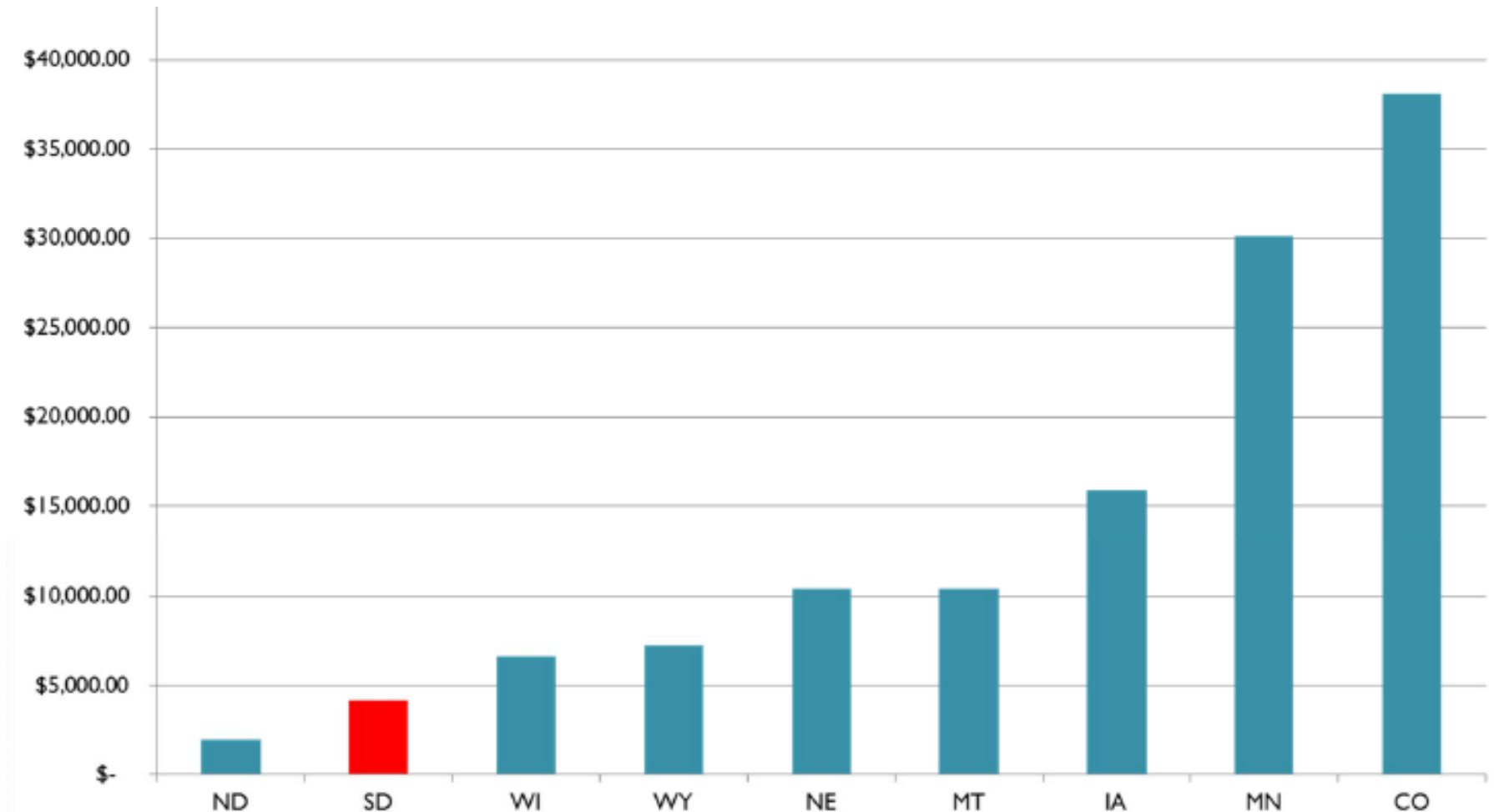
Source: 2012 Highway Statistics FHWA

# Average Construction Investment Per Mile



Source: 2012 Highway Statistics FHWA

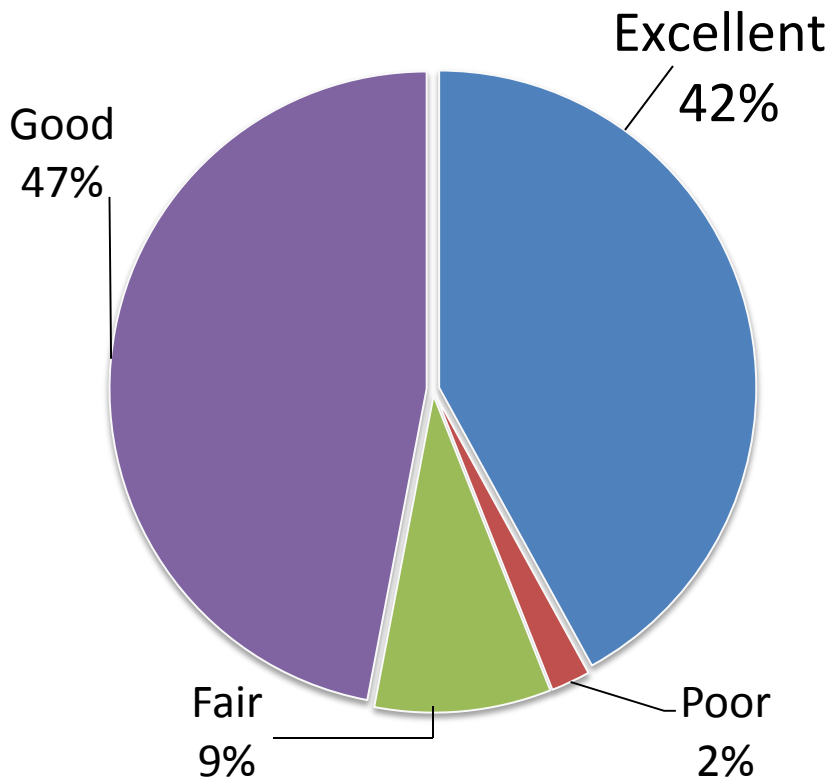
# Roadway Maintenance Cost Per Mile



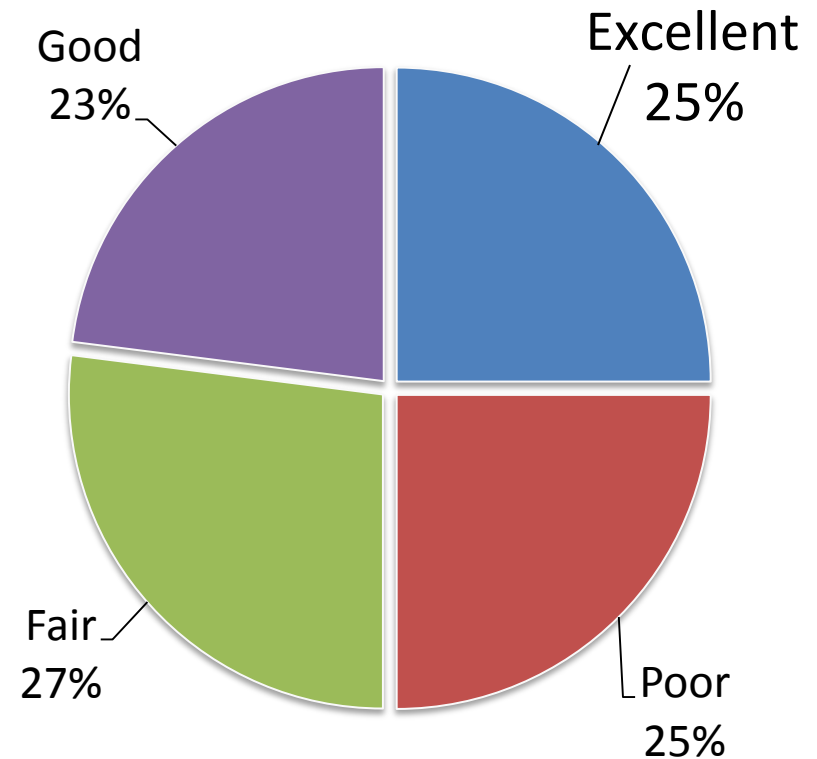
Source: 2012 Highway Statistics FHWA

# Current and Future State Pavement Condition

**2014 Condition**



**2024 Projected Condition**



# 57 County Self-Assessed Surveys

- **Overall Condition of Paved Roads** **4.86 of 10**
  - Percent in Failing Condition 20%
  - Percent in Poor Condition 19%
  - Percent in Fair Condition 32%
  - Percent in Good Condition 21%
  - Percent in Excellent Condition 9%
- **Overall Condition of Gravel Roads** **6.2 of 10**
  - Percent in Failing Condition 9%
  - Percent in Poor Condition 17%
  - Percent in Fair Condition 30%
  - Percent in Good Condition 36%
  - Percent in Excellent Condition 10%



## Structurally Deficient

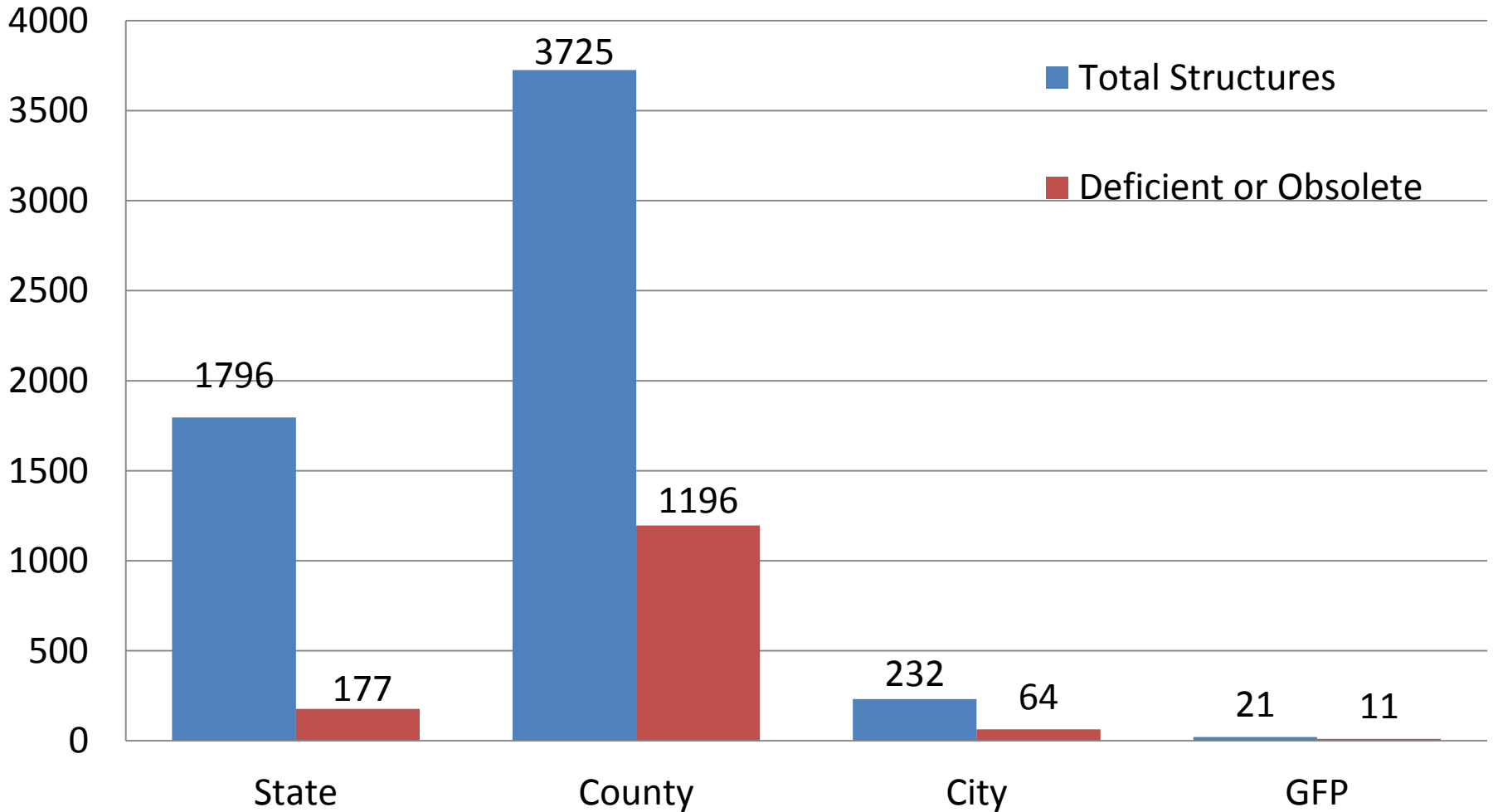
- Term is an indicator of when certain elements of a bridge need replacement or repair
- Classification does not necessarily mean bridge is unsafe
- 4.7% of state structures are structurally deficient
- 28% of county structures are structurally deficient

## Functionally Obsolete

- Term refers to a substandard feature within a structure relative to its design
- Example: inadequate vertical or horizontal clearances
- Classification is not an indicator of safety
- 5.1% of state structures are functionally obsolete
- 3% of county structures are functionally obsolete

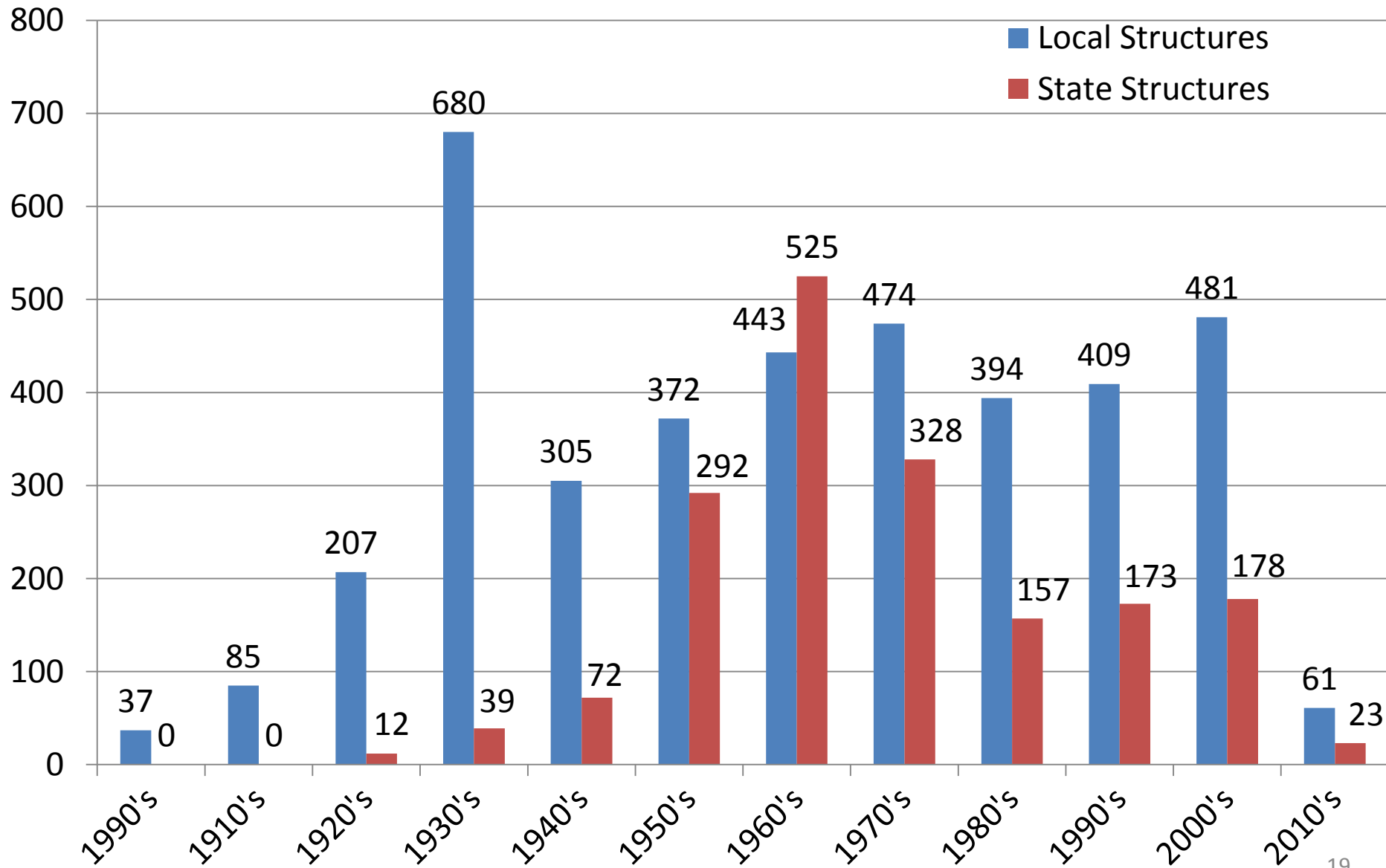
# Total Number of Structures\* vs. Structurally Deficient or Functionally Obsolete

1,448 = 25%



\*Structure = 20 feet or longer 18

# Structures Built by Decade



# Importance of Maintaining Transportation Infrastructure

- Vital to South Dakota's economy and the movement of goods
  - Agriculture
  - Tourism
  - Business
- Critical to keep roads safe for residents, families, and movement of commercial goods

**If you got it, a road  
brought it. Not much is  
parachuted  
in!**

